

PATENT

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Docket No.: SCHMIDT-24

In re Application of:)	
VALERIAS SCHMIDT)	
Appl. No.: 10/566,859)	Confirmation No.: 2177
Filing Date: February 1, 2006)	
For: ELECTRIC MACHINE WITH ROTOR)	
COOLING AND CORRESPONDING)	
COOLING METHOD)	

SECOND PRELIMINARY AMENDMENT

Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

S I R:

Preliminary to the first Official Action in the above-entitled application, please amend the application as follows.

The Commissioner is hereby also authorized to charge any fees which may be required during the pendency of this application, including any patent application processing fees under 37 C.F.R. 1.17, and any filing fees under 37 C.F.R. 1.16, including presentation of extra claims, or credit any overpayment to Deposit Account No: 06-0502.

Please amend the above-entitled application as follows:

**AMENDMENTS TO THE CLAIMS WITH MARKINGS TO SHOW CHANGES
MADE, AND LISTING OF ALL CLAIMS WITH PROPER IDENTIFIERS**

1. (Currently amended) A rotor device, ~~with~~ comprising:
a laminated core arrangement (8), ~~which has~~ having a plurality of axial bores ~~[[(3, 3')]]~~ for the conduction of a coolant, and
two rotor pressure rings ~~[[(1, 101), between which]]~~ for axial securement of the laminated core arrangement (8) ~~is fixed axially therebetween~~, wherein at least one of the two rotor pressure rings ~~[[(1, 101)]]~~ is configured for ~~the targeted~~ routing of the coolant through the axial bores ~~[[(3, 3')]]~~, ~~characterized in that~~ and has a plurality of coolant routing walls (5) which project obliquely outward ~~on the at least one rotary pressure ring (1, 101), so that they~~ and are able to conceal ~~in each case~~ one or more of the bores (3, 3') in the an axial direction.
2. (Currently amended) The rotor device as claimed in claim 1, wherein at least one of the rotor pressure rings combines the axial bores (3, 3') ~~is combined~~ into a plurality of groups of axial bores ~~by means of at least one of the rotor pressure rings (1, 101), so that the~~ with a coolant stream through the axial bores ~~[[(3, 3')]]~~ of a group is being essentially identical.
3. (Currently amended) The rotor device as claimed in claim 2, wherein ~~in each case~~ each of the groups has two, three or four axial bores (3, 3') ~~are combined in a group~~.
4. (Currently amended) The rotor device as claimed in ~~one of the preceding claims~~ claim 1, wherein the axial bores (3, 3') ~~or groups of bores (3, 3')~~ are ~~coolable~~ contradirectionally conduct coolant in opposite directions with respect to one another.

5. (Currently amended) The rotor device as claimed in ~~one of the preceding claims~~ claim 1, wherein the at least one of the rotor pressure rings has rounded edges at predetermined areas radii for improving ~~the~~ a coolant flow ~~are formed or cast on at predetermined edges of the at least one rotor pressure ring (1, 101).~~
6. (Currently amended) The rotor device as claimed in ~~one of the preceding claims~~ claim 1, wherein the at least one rotor pressure ring ~~[(1)]~~ is configured as a fan.
7. (Currently amended) The rotor device as claimed in claim 6, wherein the at least one rotor pressure ring ~~[(1, 101)]~~ is ~~produced~~ constructed in one piece.
8. (Currently amended) The rotor device as claimed in ~~one of the preceding claims~~ claim 1, wherein the at least one rotor pressure ring ~~[(1, 101)]~~ is ~~manufactured from~~ made of spheroidal graphite iron.
9. (Currently amended) The rotor device as claimed in ~~one of the preceding claims~~ claim 1, wherein the two rotor pressure rings ~~(1) possess a similar construction and are arranged~~ extend on a common axis in such a manner that the rotor pressure rings are disposed in circumferentially offset relationship about by a bore or a group of bores (3, 3') so as to be offset in the circumferential direction.
- 10.-14. (Canceled)
15. (Currently amended) An electric machine having a rotor device as claimed in ~~one of claims~~ claim 1 to 9.

16. (New) The rotor device as claimed in claim 2, wherein each of the groups has three axial bores.
17. (New) The rotor device as claimed in claim 2, wherein each of the groups has four axial bores.
18. (New) The rotor device as claimed in claim 1, wherein the at least one of the rotor pressure rings has formed thereon an attachment for providing rounded edges at predetermined areas for improving the a coolant flow.
19. (New) The rotor device as claimed in claim 18, wherein the attachment is cast onto the at least one of the rotor pressure rings.
20. (New) The rotor device as claimed in claim 2, wherein the two rotor pressure rings extend on a common axis in such a manner that the rotor pressure rings are disposed in circumferentially offset relationship by a group of bores.